Modelling the Education Supply Chain with Network Data Envelopment Analysis

Authors : Sourour Ramzi, Claudia Sarrico

Abstract : Little has been done on network DEA in education, and nobody has attempted to model the whole education supply chain using network DEA. As such the contribution of the present paper is to propose a model for measuring the efficiency of education supply chains using network DEA. First, we use a general survey of data envelopment analysis (DEA) to establish the emergent themes for research in DEA, and focus on the theme of Network DEA. Second, we use a survey on two-stage DEA models, and Network DEA to write a state of the art on Network DEA, particularly applied to supply chain management. Third, we use a survey on DEA applications to establish the most influential papers on DEA education applications, in order to establish the state of the art on applications of DEA in education, in general, and applications of DEA to education using network DEA, in particular. Finally, we propose a model for measuring the performance of education supply chains of different education systems (countries or states within a country, for instance). We then use this model on some empirical data. **Keywords :** supply chain, education, data envelopment analysis, network DEA

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